fenseless members of the human race. As physicians dedicated and trained to preserve human life, we should not apathetically sit by and allow our profession to accept the miserable role of social executioner.

DALE JOHN STRAWN, MD Visalia, California

## On Refrigerating Unused Pitressin Tannate in Oil

To the Editor: In "The Clinical Physiology of Water Metabolism—Part II" (November 1979), the authors, in discussing the treatment of diabetes insipidus, suggest that unused portions of Pitressin Tannate in Oil may be stored in the refrigerator. Although not stated in the package insert provided by Parke, Davis & Co., this preparation of vasopressin suspended in peanut oil should not be refrigerated. Refrigeration will cause a reduction in solubility with precipitation or crystallization of the ingredients. I would also question the practice of saving the remaining contents of a single-use ampule since the formulation does not contain a preservative.

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## REFERENCE

1. Romankiewicz JA, McManus J, Gotz UP, et al: Medications not to be refrigerated. Am J Hosp Pharm 36:1541-1545, Nov 1979

## Dr. Kleeman Replies

To the Editor: The authors appreciate the comments of Dr. Kikugawa. Pitressin Tannate in Oil is used far less frequently today in the treatment of diabetes insipidus because of the availability of preparations that are simpler and more practical to administer. We were unaware of the effect of refrigeration, and we agree completely with her comments.

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## Why Mandatory CPR?

TO THE EDITOR: At the latest California Medical Association-California Hospital Association Audit Workshop, our team demonstrated a quality of care study on "Code Blue." Its objective was to improve staff performance in cardiopulmonary resuscitation. According to documentation in the medical record flow sheets, our doctors, nurses

and hospital support system were functioning very well indeed. But so much for process criteria; what about outcome? Results were dismal: only 33 percent of patients survived cardiopulmonary resucitation (CPR) and a bare 11 percent left the hospital alive.

These figures are reflected in studies from other hospitals, large and small, with or without coronary care units, emergency rooms or cardiologists. Even with intensive care, the CPR salvage seems to depend more on underlying diseases than on the best staff efforts to respond. Evidently here is an example of statistically unrelated process and outcome, or the possibility of an undeveloped "code-no code" policy.

Yet the Joint Commission on Accreditation of Hospitals' (JCAH) standard on continuing medical education requires that all staff doctors "have participated in basic CPR training and are considered so qualified." When our education committee wrote to the JCAH about this, the answer made two points: even if CPR is a rare event, wherever it happens, all doctors should know the ABC's of sustaining life; and "a CPR requirement was established because there is an identifiable need to enhance the quality of this particular aspect of care." The AMA News also produced a poll showing that doctors by and large had approved of this universal requirement for hospital staff appointment.

Consequently the California Medical Association endorsed this concept, hospital staff bylaws adopted it as a biennial mandate and now from one to four hours per physician are expended meeting this continuing medical education need—approved, it is to be hoped, for Category 1 credits. For our medical staff this amounts to about 300 professional hours a year, time away from patients. However, studies continue to show that special CPR teams get to all Code Blues, that doctors do not carry out CPR anywhere else and that CPR survival in hospital has not significantly changed. Or did we miss some data?

So is it not about time, before more good intentions become staff requirements, for this continuing medical education to be scientifically evaluated? At least it would guide us in the amount and kind of CPR best for physicians to know, rather than the usual overtraining recommended.

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